

WHAT IS CLAIMED IS:

1 1. A method of initiating a call between users with reduced call set-up
2 times using one or more telecommunication networks, the method being provided between at
3 least a pair of H.324-like terminals coupled to the one or more telecommunication networks,
4 the method comprising:

5 providing one or more preferences for a call associated with a first terminal
6 and a second terminal, the one or more preferences being associated with an initial mode of
7 operation for the call between the first terminal and the second terminal;

8 processing the one or more preferences as a Custom Message;

9 embedding the Custom Message in a predetermined field of a call initiation
10 message;

11 transferring the Custom Message from the first terminal to the second terminal
12 through a telecommunication network using call signaling;

13 processing the Custom Message by the second terminal;

14 transferring a Custom Response Message by the second terminal using a call
15 signaling response message to indicate to the first terminal the initial mode of operation; and

16 exchanging information between the first terminal and the second terminal
17 after the initial mode of operation has been established.

1 2. The method of claim 1 wherein the information comprises voice and
2 video.

1 3. The method of claim 1 wherein the one or more preferences is
2 associated with an ITU-T ASN.1 custom message.

1 4. The method of claim 1 wherein the one or more preferences is coded
2 using a modulated signal.

1 5. The method of claim 1 wherein the first terminal is an H.324-like
2 gateway.

1 6. The method of claim 1 wherein the second terminal is an H.324-like
2 gateway.

1 7. A method of initiating a call between users with reduced call set-up
2 times using one or more telecommunication networks, the method being provided between at

least a pair of H.324-like terminals coupled to the one or more telecommunication networks,
the method comprising:
transmitting a call signaling message from a first terminal to a second terminal
through a telecommunication network to initiate a call;
establishing a bearer channel between the first terminal and the second
terminal once the call signaling message has been received by the second terminal;
determining a common mobile level for operation;
providing one or more custom Non-Standard H.245 messages or custom Non-
Standard fields in standard messages, the one or more custom H.245 messages or custom
Non-Standard fields being associated with one or more set up parameters for an initial
predetermined mode of operation;
transmitting the one or more custom Non-Standard H.245 messages or custom
Non-Standard fields in standard messages from the first terminal to the second terminal;
transmitting a custom Non-Standard response message associated with the one
or more custom Non-Standard H.245 messages or custom Non-Standard fields from the
second terminal to the first terminal;
processing the one or more custom H.245 messages or custom Non-Standard
fields during a predetermined time period; and
establishing the initial predetermined mode of operation between the first
terminal and the second terminal through the bearer channel based upon at least one or more
of the custom H.245 messages or custom Non-Standard fields.

8. The method of claim 7 wherein the one or more custom Non-Standard
H.245 messages are represented themselves as one or more Non-Standard Capabilities
embedded in a H.245 terminal capability set request message.

9. The method of claim 7 wherein one or more user preferences, either
coded or explicit, are provided in one of the custom Non-Standard H.245 messages.

10. A method of initiating a call between users with reduced call set-up
times using one or more telecommunication networks, the method being provided between at
least a pair of H.324-like terminals coupled to the one or more telecommunication networks,
the method comprising:
transmitting a call signaling message from a first terminal to a second terminal
through a telecommunication network to initiate a call;

7 establishing a bearer channel between the first terminal and the second
8 terminal once the call signaling message has been received by the second terminal;
9 determining a common mobile level;
10 determining two or more H.245 messages associated with set up parameters
11 for an initial predetermined mode of operation;
12 concatenating the two or more H.245 messages into one SRP command frame
13 according to a predetermined size of the SRP command frame;
14 transmitting the SRP command frame including the two or more H.245
15 messages from the first terminal to the second terminal through a telecommunication
16 network;
17 transmitting an SRP acknowledge message by the second terminal once the
18 SRP command frame has been received by the second terminal;
19 processing at least the two or more H.245 messages during a predetermined
20 time period; and
21 establishing the initial predetermined mode of operation between the first
22 terminal and the second terminal through the bearer channel.

1 11. The method of claim 10 wherein the mobile level detection is
2 performed according to at least one selected from the group consisting of H.324 baseline also
3 known as mobile level 0, mobile level 1 also known as ITU-T H.223 annex A, mobile level 2
4 also known as ITU-T H.223 annex B, and mobile level 3 also known as ITU-T H.223 annex
5 C.

1 12. The method of claim 10 further comprising transmitting another SRP
2 command frame including two or more H.245 messages only after the SRP acknowledge
3 message has been received by the first terminal.

1 13. The method of claim 10 wherein the reduced call set up time is at least
2 50% relative to a standard sequential exchange of the individual H.245 messages.

1 14. The method of claim 10 wherein the H.245 messages includes one or
2 more that are selected from terminal capability set request, master slave determination
3 request, open logical channel requests, and multiplex table entry definitions requests.

1 15. The method of claim 10 wherein the first terminal is a handset and the
2 second terminal is an equipment providing a H.324-like termination other than a handset.

1 16. The method of claim 10 wherein the first terminal is a handset and the
2 second terminal is a handset.

1 17. The method of claim 10 wherein the first terminal operates as a master
2 and the second terminal operates as a slave once a predetermined criterion has been
3 established.

1 18. The method of claim 10 wherein the predetermined criteria is
2 associated with a first SRP command frame.

1 19. The method of claim 10 further comprising exchanging voice and
2 video information between the first terminal and the second terminal after the initial
3 predetermined mode has been established.

1 20. The method of claim 10 wherein concatenated two or more messages
2 are encoded using a common syntax.

1 21. The method of claim 20 wherein the common syntax is the ITU-T
2 ASN.1 PER (Packed Encoding Rules).

1 22. The method of claim 10 further comprising operating in an alternative
2 normal mode if the concatenated two or more messages are not processed by the second
3 terminal.

1 23. A computer-readable medium including instructions for initiating a call
2 between users with reduced call set-up times using one or more telecommunication networks,
3 the computer-readable medium being provided between at least a pair of H.324-like terminals
4 coupled to the one or more telecommunication networks, the computer-readable medium
5 comprising:

6 one or more instructions for providing one or more preferences for a call
7 associated with a first terminal and a second terminal, the one or more preferences being
8 associated with an initial mode of operation for the call between the first terminal and the
9 second terminal;

10 one or more instructions for processing the one or more preferences as a
11 Custom Message;

12 one or more instructions for embedding the Custom Message in a
13 predetermined field of a call initiation message;
14 one or more instructions for transferring the Custom Message from the first
15 terminal to the second terminal through a telecommunication network using call signaling;
16 one or more instructions for processing the Custom Message by the second
17 terminal;
18 one or more instructions for transferring a Custom Response Message by the
19 second terminal using a call signaling response message to indicate to the first terminal the
20 initial mode of operation; and
21 one or more instructions for exchanging information between the first terminal
22 and the second terminal after the initial mode of operation has been established.

1 24. The computer-readable medium of claim 23 wherein the information
2 comprises voice and video.

1 25. The computer-readable medium of claim 23 wherein the one or more
2 preferences is associated with an ITU-T ASN.1 custom message.

1 26. The computer-readable medium of claim 23 wherein the one or more
2 preferences is coded using a modulated signal.

1 27. The computer-readable medium of claim 23 wherein the first terminal
2 is an H.324-like gateway.

1 28. The computer-readable medium of claim 23 wherein the second
2 terminal is an H.324-like gateway.

1 29. A computer-readable medium including instructions for initiating a call
2 between users with reduced call set-up times using one or more telecommunication networks,
3 the computer-readable medium being provided between at least a pair of H.324-like terminals
4 coupled to the one or more telecommunication networks, the computer-readable medium
5 comprising:

6 one or more instructions for transmitting a call signaling message from a first
7 terminal to a second terminal through a telecommunication network to initiate a call;

8 one or more instructions for establishing a bearer channel between the first
9 terminal and the second terminal once the call signaling message has been received by the
10 second terminal;
11 one or more instructions for determining a common mobile level for
12 operation;
13 one or more instructions for providing one or more custom Non-Standard
14 H.245 messages or custom Non-Standard fields in standard messages, the one or more
15 custom H.245 messages or custom Non-Standard fields being associated with one or more set
16 up parameters for an initial predetermined mode of operation;
17 one or more instructions for transmitting the one or more custom Non-
18 Standard H.245 messages or custom Non-Standard fields in standard messages from the first
19 terminal to the second terminal;
20 one or more instructions for transmitting a custom Non-Standard response
21 message associated with the one or more custom Non-Standard H.245 messages or custom
22 Non-Standard fields from the second terminal to the first terminal;
23 one or more instructions for processing the one or more custom H.245
24 messages or custom Non-Standard fields during a predetermined time period; and
25 one or more instructions for establishing the initial predetermined mode of
26 operation between the first terminal and the second terminal through the bearer channel based
27 upon at least one or more of the custom H.245 messages or custom Non-Standard fields.

1 30. The computer-readable medium of claim 29 wherein the one or more
2 custom Non-Standard H.245 messages are represented themselves as one or more Non-
3 Standard Capabilities embedded in a H.245 terminal capability set request message.

1 31. The computer-readable medium of claim 29 wherein one or more user
2 preferences, either coded or explicit, are provided in one of the custom Non-Standard H.245
3 messages.

1 32. A computer-readable medium including instructions for initiating a call
2 between users with reduced call set-up times using one or more telecommunication networks,
3 the computer-readable medium being provided between at least a pair of H.324-like terminals
4 coupled to the one or more telecommunication networks, the computer-readable medium
5 comprising:

6 one or more instructions for transmitting a call signaling message from a first
7 terminal to a second terminal through a telecommunication network to initiate a call;
8 one or more instructions for establishing a bearer channel between the first
9 terminal and the second terminal once the call signaling message has been received by the
10 second terminal;
11 one or more instructions for determining a common mobile level;
12 one or more instructions for determining two or more H.245 messages
13 associated with set up parameters for an initial predetermined mode of operation;
14 one or more instructions for concatenating the two or more H.245 messages
15 into one SRP command frame according to a predetermined size of the SRP command frame;
16 one or more instructions for transmitting the SRP command frame including
17 the two or more H.245 messages from the first terminal to the second terminal through a
18 telecommunication network;
19 one or more instructions for transmitting an SRP acknowledge message by the
20 second terminal once the SRP command frame has been received by the second terminal;
21 one or more instructions for processing at least the two or more H.245
22 messages during a predetermined time period; and
23 one or more instructions for establishing the initial predetermined mode of
24 operation between the first terminal and the second terminal through the bearer channel.

1 33. The computer-readable medium of claim 32 wherein the mobile level
2 detection is performed according to at least one selected from the group consisting of H.324
3 baseline also known as mobile level 0, mobile level 1 also known as ITU-T H.223 annex A,
4 mobile level 2 also known as ITU-T H.223 annex B, and mobile level 3 also known as ITU-T
5 H.223 annex C.

1 34. The computer-readable medium of 32 further comprising transmitting
2 another SRP command frame including two or more H.245 messages only after the SRP
3 acknowledge message has been received by the first terminal.

1 35. The computer-readable medium of claim 32 wherein the reduced call
2 set up time is at least 50% relative to a standard sequential exchange of the individual H.245
3 messages.

1 36. The computer-readable medium of claim 32 wherein the H.245
2 messages includes one or more that are selected from terminal capability set request, master
3 slave determination request, open logical channel requests, and multiplex table entry
4 definitions requests.

1 37. The computer-readable medium of claim 32 wherein the first terminal
2 is a handset and the second terminal is an equipment providing a H.324-like termination other
3 than a handset.

1 38. The computer-readable medium of claim 32 wherein the first terminal
2 is a handset and the second terminal is a handset.

1 39. The computer-readable medium of claim 32 wherein the first terminal
2 operates as a master and the second terminal operates as a slave once a predetermined
3 criterion has been established.

1 40. The computer-readable medium of claim 32 wherein the predetermined
2 criteria is associated with a first SRP command frame.

1 41. The computer-readable medium of claim 32 further comprising
2 exchanging voice and video information between the first terminal and the second terminal
3 after the initial predetermined mode has been established.

1 42. The computer-readable medium of claim 32 wherein concatenated two
2 or more messages are encoded using a common syntax.

1 43. The computer-readable medium of claim 42 wherein the common
2 syntax is the ITU-T ASN.1 PER (Packed Encoding Rules).

1 44. The computer-readable medium of claim 32 further comprising
2 operating in an alternative normal mode if the concatenated two or more messages are not
3 processed by the second terminal.